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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/623,474	09/13/2000	Masamoto Uenishi	197173US0PCT	2043

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EXAMINER

CHANG, VICTOR S

ART UNIT	PAPER NUMBER
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1771

10

DATE MAILED: 04/04/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

**Office Action Summary**

Application No.

09/623,474

Applicant(s)

UENISHI ET AL.

Examiner

Victor S Chang

Art Unit

1771

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --****Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1,3-9 and 11-17 is/are pending in the application.
- 4a) Of the above claim(s) 9 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1,3-8 and 11-17 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

**Priority under 35 U.S.C. §§ 119 and 120**

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

**Attachment(s)**

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other:

### DETAILED ACTION

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.
2. Rejections not maintained are withdrawn.

#### ***Claim Rejections - 35 USC § 112***

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

4. Claims 1, 3-8 and 11-17 are rejected under 35 U.S.C. 112, first paragraph, as containing subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

More particularly, in claim 1, lines 1-6, the <sup>five</sup>~~four~~ consecutive open ended "comprising" renders the claim unduly broad and in excess of its provided enablement.

5. Claims 1, 3-8 and 11-17 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claim 1, lines 1-6, the <sup>five</sup>~~four~~ consecutive open ended "comprising" renders the claim vague, indefinite and confusing.

***Response to Amendment***

6. Newly amended claims 1, 3-8 and newly added claims 11-17 are rejected under 35 U.S.C. 103(a) as being unpatentable over EP 0740952 either individually, or in view of JP 3-169330 (Abstract), substantially for the reasons set forth in section 5 of Paper No. 7, together with the following additional observations.

With respect to Applicants' Response arguing that "There is no description in EP 0740952 that the composite hollow fiber membrane produced in the reference has an overall porosity of not less than 75% by volume" (Response, page 5, first complete paragraph), the Examiner would like to point out that in Table 1 (page 13), EP '952 shows the porosity of the membrane in the range of 64-76%, Applicants remarks to the contrary notwithstanding.

With respect to Applicants argument that EP '952 does not teach "the relationship of the isothermal crystallization time of the resin used for the outermost layer and the innermost layer and the isothermal crystallization time of the resin used for the dense layer of amended claim 1" (Response, page 5, first complete paragraph), the Examiner reiterates (first complete paragraph, page 4, Paper No. 7) that it is noticed that the method of making the membrane by the instant claimed invention is essentially the same as EP '952, therefore it is believed that the selection of a suitable ratio of the isothermal crystallization time between the layers is either an inherent physical property of the polyolefins selected for the membrane manufacturing process, or an obvious optimization to one of ordinary skill in the art, motivated by the desire to form suitable sizes of the lamella crystals and hence the proper size of the micropores in each layers.

Art Unit: 1771

Applicant must show that the resultant article is patentably distinct from those taught by the reference.

For newly added claim 11, EP '952 clearly shows in Figs. 1-4 that the microfibrils are divided into groups of a plurality of pieces that are bundled together and that the micropores are elliptic.

For newly added claim 12, the Examiner reiterates (see first paragraph, page 5, Paper No. 5) that EP '952 teaches that the membrane is coated by 3 to 30% by weight of hydrophilic polymer (page 3, line 10).

For newly added claims 14 and 15, the Examiner reiterates (see section 5, Paper No. 5) that EP '952 is directed to a composite hollow fiber microporous polyolefin membrane, which inherently encompasses isotactic polypropylene.

For claim 16, EP '952 shows in Table 1 that the membrane internal diameter is in the range of 278-458  $\mu\text{m}$ .

For claim 17, EP '952 shows in Table 1 that the membrane total thickness is in the range of 60-85  $\mu\text{m}$ .

7. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not

Art Unit: 1771

mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

8. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Victor S Chang whose telephone number is 703-605-4296. The examiner can normally be reached on 8:30 - 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Terrel H Morris can be reached on 703-308-2414. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9310 for regular communications and 703-872-9311 for After Final communications.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-0661.

VSC  
April 3, 2003

DANIEL ZIRKER  
PRIMARY EXAMINER  
GROUP ~~1300~~  
1700

*Daniel Zinker*